## REMARKS

In the Office Action, the Examiner rejected Claims 1, 2, 4-7 and 9-36, which are all of the pending claims, under 35 U.S.C. 103 as being unpatentable over the prior art. Specifically, Claims 1, 2, 4-7 and 9-34 were rejected as being unpatentable over U.S. Patent 6,598,230 (Ballhorn) in view of U.S. Patent 6,054,987 (Richardson); and Claims 35 and 36 were rejected as being unpatentable over Ballhorn in view of Richardson and further in view of U.S. Patent 6,374,336 (Peters, et al.).

Independent Claims 1, 6, 11, 18, 25 and 29 are being amended to better define the subject matters of these claims.

For the reasons discussed below, claims 1, 2, 4-7 and 9-36 patentably distinguish over the prior art and are allowable, and the Examiner is thus requested to reconsider and to withdraw the rejections of Claims 1, 2, 4-7 and 9-36 an to allow these claims.

As explained in more detail in the present application, this invention relates to procedures for monitoring or representing aspects of video-on-demand services. In a first aspect, a tree representation is used to provide multilevel information about the video-on-demand system. A display showing a tree having a plurality of nodes may be generated, and information about video-on-demand services is embedded in these nodes. For example, the nodes may be embedded with information about the equipment used to provide the video-on-demand services, the users, or the video-on-demand programs themselves.

In this first aspect, a system administrator of the video-on-demand system interacts with the nodes to configure and to monitor the connections between servers of the system and the customers. In particular, when one of the customers requests a program, the system administrator interacts with the nodes of the display (i) to select one of the servers to provide

the requested program to that one of the customers and (ii) to assign to the one of the customers one or more of a multitude of channels to develop a path between the selected one of the servers and said one of the customers. This channel is then used for transmitting the requested program from the selected one of the servers to the one of the customers.

With a second aspect of the present invention, a matrix is constructed from a pair of catalogs of elements of a video-on-demand system. Connection representations are formed for at least some of the cells of the matrix, and these connection representations may be used to represent a number of relationships. For instance, these connections may be used to show relationships between users and presentations, or between the video-on-demand equipment.

In this second aspect of the invention, the system administrator interacts with the matrix cells to configure and to monitor the connections between the servers and customers of the system. For instance, when one of the customers requests a program, the system administrator interacts with the cells of the matrix to select one of the servers to provide the requested program to that one of the customers, and to assign to the one of the customers one or more of a multitude of channels to develop a path between the selected one of the servers and said one of the customers. This channel is then used for transmitting the requested program from the selected one of the servers to the one of the customers.

The references of record fail to disclose or suggest the above-described way in which the system administrator interacts with the displayed tree nodes or with the matrix cells to identify and select one or more channels that form a specified path from one of the servers to one of the customers for transmitting the requested program from that server to that customer. For instance, Ballhorn discloses a multimedia box network comprised of a data server and a plurality of multimedia boxes. The network includes at least one management station connected to the data server and to at least one of the multimedia boxes. While Ballhorn indicates that the disclosed network can be used to transmit image data or video data, this reference is primarily directed to distributing music to juke boxes.

Richardson describes a procedure for dynamically configuring group view information. This configurable information may include the name of the group view, a background image and the context. Also, as shown in Figure 6 of Richardson, a graphical image can be used to change values for various attributes, such as the background graphic and context of one or more printers.

Peters, et al. describes a procedure for transferring multiple high bandwidth streams of data between multiple storage units. The Examiner cited Peters, et al. for its disclosure of storing different catalogs in different storage units. There is no disclosure or suggestion in Peters, et al, though, of enabling the administrator of a video-on-demand system to configure and to monitor customer connections by interacting with displayed tree nodes or matrix cells.

There is an important general difference between the present invention and the methods and systems shown in Ballhorn and Richardson. Specifically, the present invention is directed to transmitting video data from a multitude of servers to a multitude of customers, while neither Ballhorn nor Richards are directed to this same purpose.

This general difference between the present invention and Ballhorn and Richards is reflected in a number of more specific differences between this invention and the prior art. For example, neither Ballhorn nor Richardson discloses a system administrator using a

graphical display or matrix cells to identify and select a path for transmitting video programs from one of a multitude of servers to one of a multitude of customers.

Each of Claims 1, 6, 11, 18, 25 and 29 is being amended to describe this feature of the invention more expressly. In particular, Claims 1, 6, 11 and 29 are being amended to describe the feature that the system administrator interacts with the nodes of the tree display, when one of the customers requests a program, (i) to select one of the servers to provide the requested program to that one of the customers and (ii) to assign to the one of the customers one or more of a multitude of channels to develop a path between the selected one of the servers and said one of the customers, where this channel is then used for transmitting the requested program from the selected one of the servers to the one of the customers.

In addition, Claims 18 and 25 are being amended to indicate that, when one of the customers requests a program, the system administrator interacts with the matrix module or the matrix cells (i) to select one of the servers to provide the requested program to that one of the customers and (ii) to assign to the one of the customers one or more of a multitude of channels to develop a path, between the selected one of the servers and said one of the customers, for transmitting the requested program from the selected one of the servers to the one of the customers.

The other references of record have been reviewed, and these other references, whether considered individually or in combination, also do not disclose or suggest this feature of the present invention.

In light of the above-discussed differences between Claims 1, 6, 11, 18, 25 and 29 and the prior art, and because of the advantages associated with those differences, it cannot be said that any of Claims 1, 6, 11, 18, 25 and 29 is obvious in view of the prior art. Accordingly,

these Claims 1, 6, 11, 18, 25 and 29 patentably distinguish over the prior art and are

allowable.

Claims 2, 4, 5 and 34 are dependent from Claim 1 and are allowable therewith; Claims

7, 9 and 10 are dependent from Claim 6 and are allowable therewith; and Claims 12-16 are

dependent from, and are allowable with, Claim 11. In addition, Claims 19-23, 35 and 36 are

dependent from, and are allowable with, Claim 18; Claims 26-28 are dependent from Claim

25 and are allowable therewith; and Claim 30 is dependent from, and is allowable with, Claim

29. Also, Claims 17, 24 and 31 incorporate by reference, and are allowable with, Claims 1,

18 and 30 respectively. Claims 31-33 are dependent from Claim 30 and are allowable

therewith.

The Examiner is thus respectfully requested to reconsider and to withdraw the

rejection of Claims 1, 2, 4-7 and 9-36 under 35 U.S.C. §103, and to allow these claims.

If the Examiner believes that a telephone conference with Applicants' Attorneys

would be advantageous to the disposition of this case, the Examiner is asked to telephone the

undersigned.

Respectfully submitted,

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